



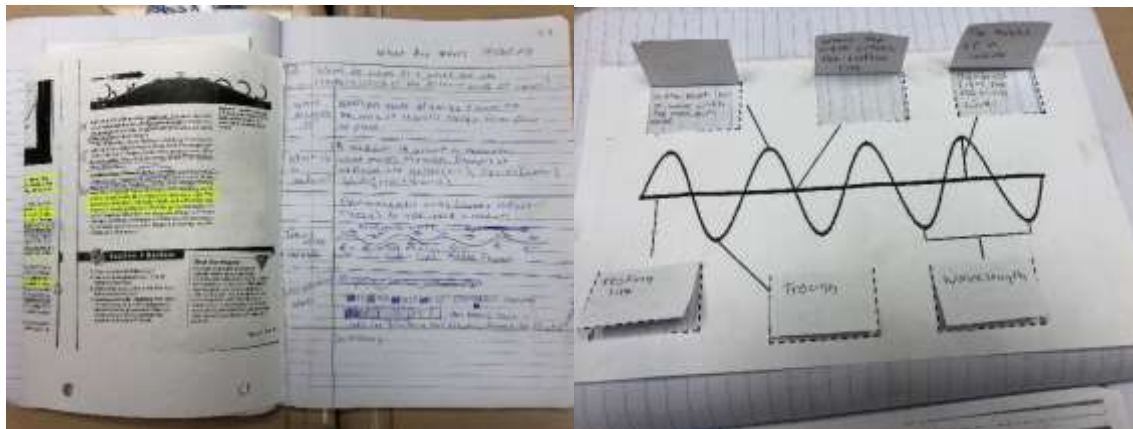
**CEDARCREST STEM/SCIENCE
NEWSLETTER 11/1: “HOWLING” INTO
NOVEMBER WITH ENGAGING
STEM/SCIENCE PROJECTS AT
CEDARCREST**

OUR CEDARCREST STEM/SCIENCE STUDENTS HAVE ONCE AGAIN ENGAGED IN MINDS ON/HANDS ON LESSONS HERE AT CEDARCREST.

6th GRADE SCIENCE:

MS KUKULL AND MR. STODDARD'S

This week in 6th grade the students began learning about waves! We will be focusing on longitudinal and transverse waves. To help them understand how waves move and the different features of waves, students modeled wave motion with an online simulator from PhET. Students even created a **flip-book** (another **AVID Literacy Strategy**) as a guide and reference for waves. Next week we will work on building a deeper understanding waves through modeling sound waves.



INTRODUCING CEDARCREST'S MAKER SPACE CLUB...Run by Ms. Kukull and Mr. Stoddard:



Students are stoked about Maker Space. We have a great group of students that come every Monday and Wednesday, about 30! They have been busy creating all kinds of things. The 3D pens, hot glue guns, Makey Makey, Sphero and fuse beads have been a popular go to for their creations. We're patiently awaiting the arrival of our 3D printers and more supplies! The students have dismantled several old computers and now they are getting the opportunity to put together a working computer to be used in the Maker Space.



Thank you to Scott Beebe, the Marysville SD Chief Technology Officer for supporting our CMS students by purchasing all the computer components. If you have any special skill sets and would like to help out in the Maker Space, we meet from 2:50-4:15 every Monday and Thursday. We would also love donations of fabric and thread to start sewing!

6TH GRADE 21ST Century Skills:

Mr. Shreeve's 21st Century students are continue their investigation of electricity by studying

current electricity. They were challenged to light a light bulb. (Not as easy as you might think...)



Students in 21st Century also use AVID literacy strategies such as Cornell Notes in order to help create a conceptual understanding of concepts such as Electricity.

EQ: How do you light a light Bulb?

MI

- 1.) Wires
 - metal/conductor
 - plastic Insulator prevents electron flow
- 2.) Battery
 - stores chemical Energy that is Transformed into electrical energy
 - allows electron flow
- 3.) Bulb
 - wire creates friction for electrons
 - resistor Transforms Elect E. into light + heat

4.) Circuit

5.) Short Circuit

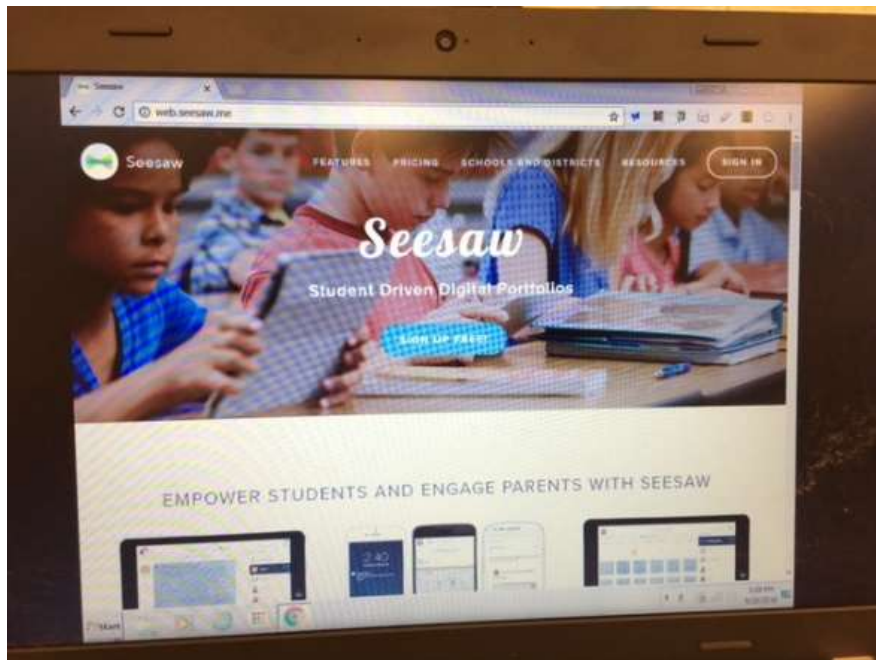
Do Not Make

Because electrons should not follow path of least resistance.

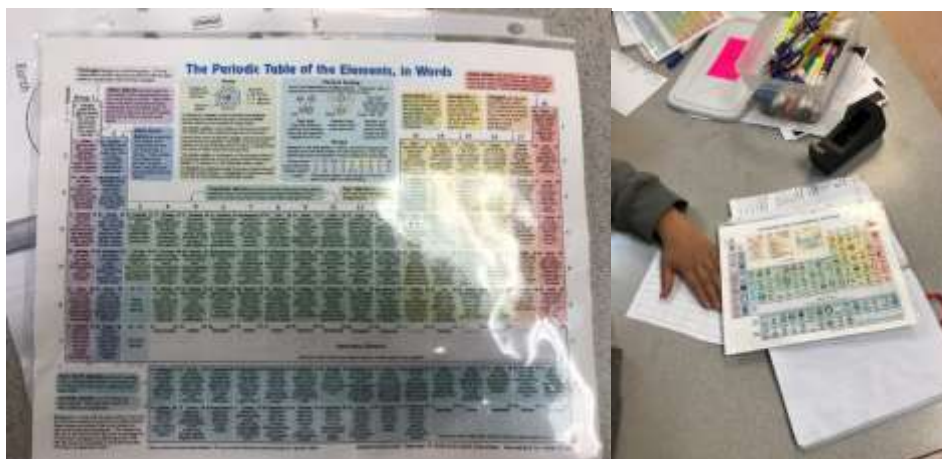


Students are developing a deeper understanding of Current Electricity thanks to their work both in Science and 21st Century —next week Tesla coils, Jacobs Ladders, and circuits, circuits and more circuits!

Again, 21st Century Students use an electronic journal called Seesaw. This allows them to keep all of their work online and it can be easily accessed with their Chrome books. Please have your son/daughter share their work with you in their electronic journal.



7th GRADE SCIENCE: Ms. Dainard'S Students are exploring the challenging world of the Periodic Table. This is a precursor for students to take chemistry in High School.



2 P+)

I will become familiar with the names & symbols of elements so I can understand that all substances have properties, that they can combine to form new substances w/ diff. props, & that all substances are made of elements. As evident by:

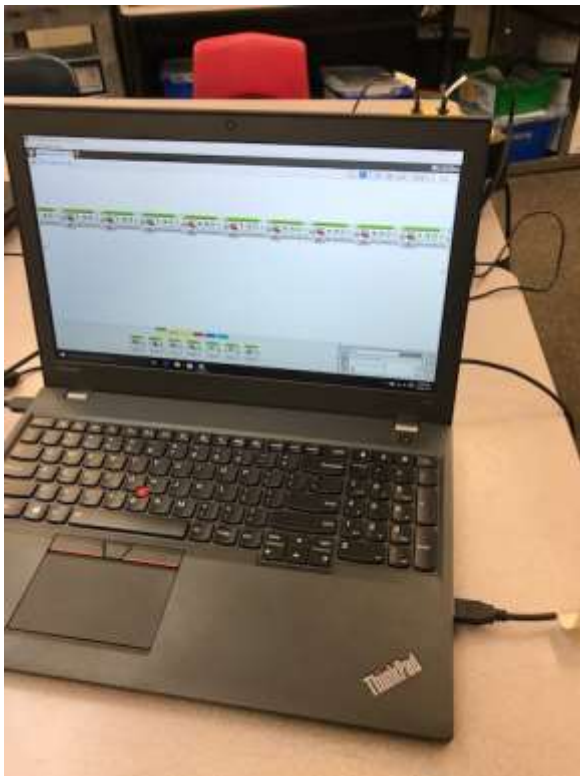
me

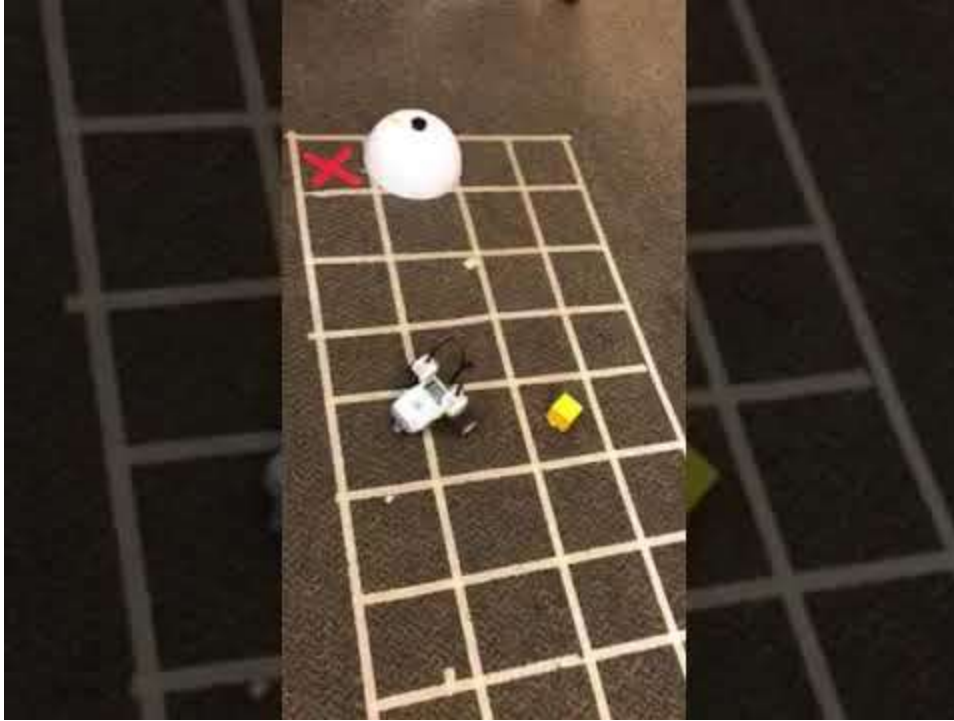
- ✓ Use the periodic table to ID & analyze elements from Inv. #1
- ✓ Conduct a rdg & answer ?'s
 - ID & describe 8 elements
- ✓ Set up & label charts
 - take a quiz

The purpose of activities such as this is to encourage collaborative learning through fun Science oriented projects that are hands on/minds on.

7TH AND 8TH GRADE STEM ROBOTICS with MR. SHREEVE:

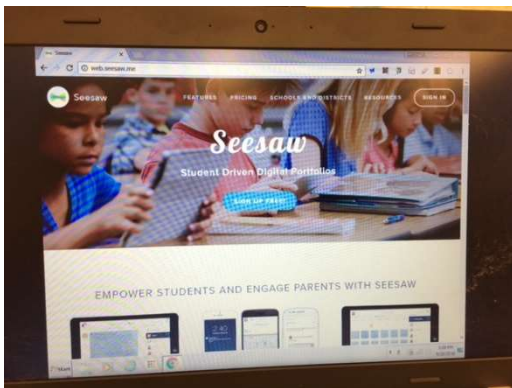
This week students are working through the engineering process of researching, designing, building, programming, testing and optimizing EV3 LEGO MINDSTORMS ROBOTS to complete the Moon Shot Challenge. They incorporated various forms of technology including their smart phones (for blue tooth control of robots), Chrome Books (for research etc...) and CTE/STEM laptops (for programming the robots) to explore some of the capabilities of the EV3 Lego Mindstorms robots.





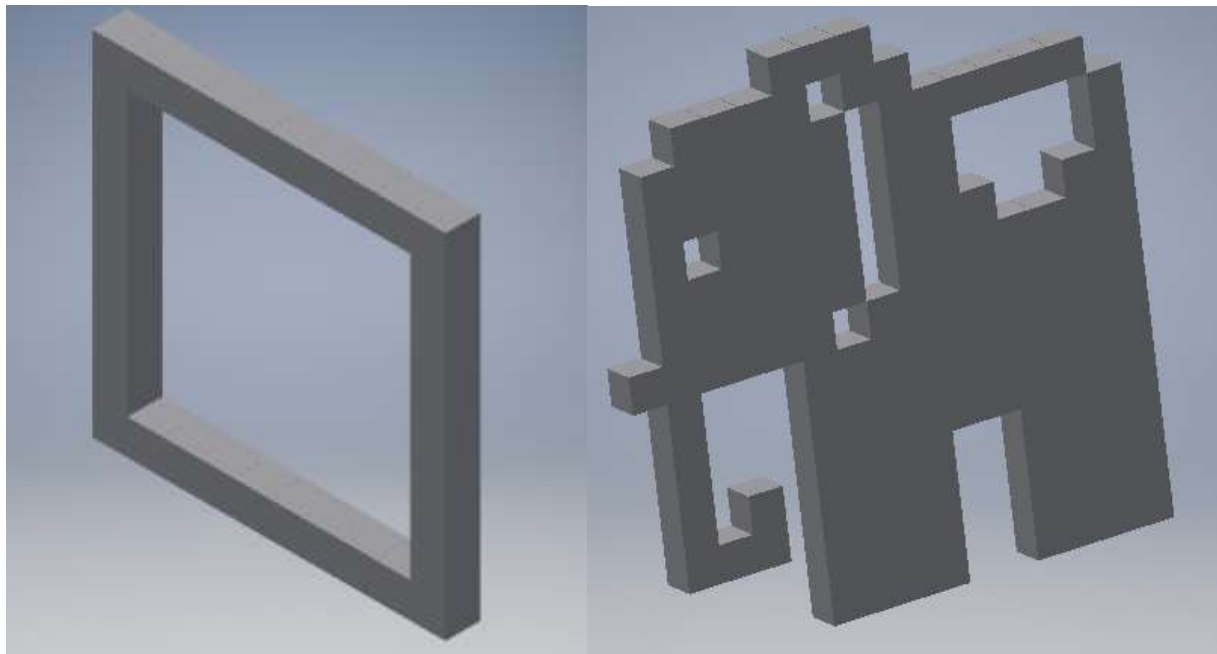
(Check out the Hyperlink above to see the robots in action on Mr. Shreeve's You Tube channel)

Just a reminder...All of the assignments for **STEM ROBOTICS**, including their research, diagrams, notes, QR Codes, Scripts and even videos will end up on Seesaw. It is an electronic journal for the class. **Please have your son/daughter share their work with you in their electronic journal.**



MR. DESCHAINED'S STEM TECH (7TH GRADE):

In STEM Technology students are learning to Sketch drawings and turn the sketches into 3D models by extruding them using the **3D modeling software "Inventor"** Then they join and constrain the cubes together



MRS. MACK'S STEM CLASSES (8TH GRADE):



In Mrs. Mack's Nutrition and Fitness students are continuing their investigation of Systems of the Body. Some of the questions they will be working on may include:

- 1. What are health and wellness?**
 - 2. What are the three areas of the wellness triangle and how do we promote wellness in each area?**
 - 3. How do our +/- lifestyle choices effect our overall wellness**
 - 4. Define the terms anatomy (what our body is) and physiology (what our body does)**
 - 4. What are the stages of the human life continuum?**
 - 5. What are developmental characteristics of each stage of human development?**
-

8TH GRADE SCIENCE:

Mr. Schaufler and Mr. Overland--

We have been learning about the thrilling life of plants, including growing Wisconsin Fast Plants and comparing the growth of the plants with and without the use of a fertilizer. Look for dirt under their fingernails and a smile on their face!



Super Science!

All of the activities described in this newsletter were designed by the STEM/Science staff at Cedarcrest to encourage Engineering and Science concepts with fun, engaging activities that may help students throughout their careers.

On behalf of the Staff in the STEM/Science Department, we are committed to making this

the best year ever for your child here at Cedarcrest Middle School.

Sincerely,

The STEM/Science Staff at Cedarcrest

Mr. Stoddard, Ms Kukull, Ms. Dainard, Mrs Delazzari, Mr. Schaufler, Mr. Overland, Mr. Deschaine, Mrs. Mack, and Mr. Shreeve

6th Science, 7th Science, 8th Science, STEM Foods, STEM Tech, STEM Robotics, and 21st Century Foundations.